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      Sommergruber, Wolfgang
      Abseher, Roger

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Val Ile Glu Ile Gln Lys Asn Ile Asp Cys Met Ser Gly Pro Cys Pro
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Phe Gly Glu Val Gln Leu Gln Pro Ser Thr Ser Leu Leu Pro Thr Leu
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Glu Leu Gln Phe Ser Ile Pro Arg Leu Arg Gln Ile Gly Pro Gly Glu
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Glu Tyr Tyr Ile Pro Gly Ser Thr Thr Asn Pro Glu Val Phe Lys Leu
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Glu Asp Lys Gln Pro Gly Asn Met Ala Gly Asn Phe Asn Leu Ser Leu
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caa ggc tgt gac caa gat gcc caa agt cca ggg atc ctc cgg ctg cag    1003
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gtg gtt gac ttg agt aat gag cga gcc atg tca ctc acc atc gag cca    1099
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Lys His Lys Ile Ser Phe Leu Cys Asp Asp Leu Thr Arg Leu Trp Met
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Asn Val Glu Lys Thr Ile Ser Cys Thr Asp His Arg Tyr Cys Gln Arg
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aaa tcc tac tca ctc cag gtg ccc agt gac atc ctc cac ctg cct gtg    1339
Lys Ser Tyr Ser Leu Gln Val Pro Ser Asp Ile Leu His Leu Pro Val
360                 365                 370                     375

gag ctg cat gac ttc tcc tgg aag ctg ctg gtg ccc aag gac agg ctc    1387
Glu Leu His Asp Phe Ser Trp Lys Leu Leu Val Pro Lys Asp Arg Leu
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agc ctg gtg ctg gtg cca gcc cag aag ctg cag cag cat aca cac gag    1435
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Gln Ile Gln Val Lys Gln Asn Ile Ser Val Thr Leu Arg Thr Phe Ala
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Pro Ser Phe Gln Gln Glu Ala Ser Arg Gln Gly Leu Thr Val Ser Phe
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ata cct tat ttc aaa gag gaa ggc gtt ttc acg gtg acc cct gac aca   1675
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Lys Ser Lys Val Tyr Leu Arg Thr Pro Asn Trp Asp Arg Gly Leu Pro
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tcc ctc acc tct gtg tcc tgg aac atc agc gtg ccc aga gac cag gtg   1771
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gcc tgc ctg act ttc ttt aag gag cgg agc ggc gtg gtc tgc cag aca   1819
Ala Cys Leu Thr Phe Phe Lys Glu Arg Ser Gly Val Val Cys Gln Thr
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His Ser Phe Trp Val Asn Ile Ser Asn Cys Ser Pro Thr Ser Gly Lys
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Cys Met Ser Gly Pro Cys Pro Phe Gly Glu Val Gln Leu Gln Pro Ser
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Thr Ser Leu Leu Pro Thr Leu Asn Arg Thr Phe Ile Trp Asp Val Lys
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Ala His Lys Ser Ile Gly Leu Glu Leu Gln Phe Ser Ile Pro Arg Leu
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Arg Gln Ile Gly Pro Gly Glu Ser Cys Pro Asp Gly Val Thr His Ser
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Ile Ser Gly Arg Ile Asp Ala Thr Val Val Arg Ile Gly Thr Phe Cys
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Ser Asn Gly Thr Val Ser Arg Ile Lys Met Gln Glu Gly Val Lys Met
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Ala Leu His Leu Pro Trp Phe His Pro Arg Asn Val Ser Gly Phe Ser
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Ile Ala Asn Arg Ser Ser Ile Lys Arg Leu Cys Ile Ile Glu Ser Val
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Phe Glu Gly Glu Gly Ser Ala Thr Leu Met Ser Ala Asn Tyr Pro Glu
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Gly Phe Pro Glu Asp Glu Leu Met Thr Trp Gln Phe Val Val Pro Ala
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His Leu Arg Ala Ser Val Ser Phe Leu Asn Phe Asn Leu Ser Asn Cys
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Glu Arg Lys Glu Glu Arg Val Glu Tyr Tyr Ile Pro Gly Ser Thr Thr
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Asn Pro Glu Val Phe Lys Leu Glu Asp Lys Gln Pro Gly Asn Met Ala
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Pro Gly Ile Leu Arg Leu Gln Phe Gln Val Leu Val Gln His Pro Gln
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Asp Leu Thr Arg Leu Trp Met Asn Val Glu Lys Thr Ile Ser Cys Thr
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Asp His Arg Tyr Cys Gln Arg Lys Ser Tyr Ser Leu Gln Val Pro Ser
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Asp Ile Leu His Leu Pro Val Glu Leu His Asp Phe Ser Trp Lys Leu
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Phe Thr Val Thr Pro Asp Thr Lys Ser Lys Val Tyr Leu Arg Thr Pro
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Ser Gly Val Val Cys Gln Thr Gly Arg Ala Phe Met Ile Ile Gln Glu
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Gly Gly Gly Val Leu Leu Leu Ser Ala Leu Gly Leu Ile Ile Cys Cys
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Val Lys Lys Lys Lys Lys Thr Asn Lys Gly Pro Ala Val Gly Ile
625             630             635             640

Tyr Asn Gly Asn Ile Asn Thr Glu Met Pro Gly Ser Gln Lys Ser Phe
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Arg Lys Gly Glu Arg Thr Met Thr Pro Met Cys Met Gln Ser Ser Arg
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Thr Pro Trp Tyr Met Gly Ile Cys Tyr Arg Ile Pro Ala Ala Pro Ser
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Cys Ser Gln Arg Trp Thr Pro Thr Gly Arg Ser Arg Ala Pro Trp Gly
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Ser Val Leu Pro Pro His Pro Pro Tyr Ala Pro Gly Pro Gln Leu Gln
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gca aaa ccc tgt tac atc gtc att tct aaa aga cat ata acc atg ttg    486
Ala Lys Pro Cys Tyr Ile Val Ile Ser Lys Arg His Ile Thr Met Leu
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                    120                      125                      130

aag agc atc ggt tta gag ctg cag ttt tcc atc cct cgc ctg agg cag   726
Lys Ser Ile Gly Leu Glu Leu Gln Phe Ser Ile Pro Arg Leu Arg Gln
        135                      140                      145

atc ggt ccg ggt gag agc tgc cca gac gga gtc act cac tcc atc agc   774
Ile Gly Pro Gly Glu Ser Cys Pro Asp Gly Val Thr His Ser Ile Ser
        150                      155                      160

ggc cga atc gat gcc acc gtg gtc agg atc gga acc ttc tgc agc aat   822
Gly Arg Ile Asp Ala Thr Val Val Arg Ile Gly Thr Phe Cys Ser Asn
165                      170                      175                 180

ggc act gtg tcc cgg atc aag atg caa gaa gga gtg aaa atg gcc tta   870
Gly Thr Val Ser Arg Ile Lys Met Gln Glu Gly Val Lys Met Ala Leu
                185                      190                      195

cac ctc cca tgg ttc cac ccc aga aat gtc tcc ggc ttc agc att gca   918
His Leu Pro Trp Phe His Pro Arg Asn Val Ser Gly Phe Ser Ile Ala
                200                      205                      210

aac cgc tca tct ata aaa cgt ctg tgc atc atc gag tct gtg ttt gag   966
Asn Arg Ser Ser Ile Lys Arg Leu Cys Ile Ile Glu Ser Val Phe Glu
                215                      220                      225

ggt gaa ggc tca gca acc ctg atg tct gcc aac tac cca gaa ggc ttc   1014
Gly Glu Gly Ser Ala Thr Leu Met Ser Ala Asn Tyr Pro Glu Gly Phe
        230                      235                      240

cct gag gat gag ctc atg acg tgg cag ttt gtc gtt cct gca cac ctg   1062
Pro Glu Asp Glu Leu Met Thr Trp Gln Phe Val Val Pro Ala His Leu
245                      250                      255                 260

cgg gcc agc gtc tcc ttc ctc aac ttc aac ctc tcc aac tgt gag agg   1110
Arg Ala Ser Val Ser Phe Leu Asn Phe Asn Leu Ser Asn Cys Glu Arg
                265                      270                      275

aag gag gag cgg gtt gaa tac tac atc ccg ggc tcc acc acc aac ccc   1158
Lys Glu Glu Arg Val Glu Tyr Tyr Ile Pro Gly Ser Thr Thr Asn Pro
                280                      285                      290

gag gtg ttc aag ctg gag gac aag cag cct ggg aac atg gcg ggg aac   1206
Glu Val Phe Lys Leu Glu Asp Lys Gln Pro Gly Asn Met Ala Gly Asn
                295                      300                      305

ttc aac ctc tct ctg caa ggc tgt gac caa gat gcc caa agt cca ggg   1254
Phe Asn Leu Ser Leu Gln Gly Cys Asp Gln Asp Ala Gln Ser Pro Gly
        310                      315                      320

atc ctc cgg ctg cag ttc caa gtt ttg gtc caa cat cca caa aat gaa   1302
Ile Leu Arg Leu Gln Phe Gln Val Leu Val Gln His Pro Gln Asn Glu
325                      330                      335                 340
```

```
agc aat aaa atc tac gtg gtt gac ttg agt aat gag cga gcc atg tca      1350
Ser Asn Lys Ile Tyr Val Val Asp Leu Ser Asn Glu Arg Ala Met Ser
                345                 350             355


ctc acc atc gag cca cgg ccc gtc aaa cag agc cgc aag ttt gtc cct      1398
Leu Thr Ile Glu Pro Arg Pro Val Lys Gln Ser Arg Lys Phe Val Pro
                360             365             370

ggc tgt ttc gtg tgt cta gaa tct cgg acc tgc agt agc aac ctc acc      1446
Gly Cys Phe Val Cys Leu Glu Ser Arg Thr Cys Ser Ser Asn Leu Thr
            375             380             385

ctg aca tct ggc tcc aaa cac aaa atc tcc ttc ctt tgt gat gat ctg      1494
Leu Thr Ser Gly Ser Lys His Lys Ile Ser Phe Leu Cys Asp Asp Leu
        390             395             400

aca cgt ctg tgg atg aat gtg gaa aaa acc ata agc tgc aca gac cac      1542
Thr Arg Leu Trp Met Asn Val Glu Lys Thr Ile Ser Cys Thr Asp His
405             410             415             420

cgg tac tgc caa agg aaa tcc tac tca ctc cag gtg ccc agt gac atc      1590
Arg Tyr Cys Gln Arg Lys Ser Tyr Ser Leu Gln Val Pro Ser Asp Ile
                425             430             435

ctc cac ctg cct gtg gag ctg cat gac ttc tcc tgg aag ctg ctg gtg      1638
Leu His Leu Pro Val Glu Leu His Asp Phe Ser Trp Lys Leu Leu Val
            440             445             450

ccc aag gac agg ctc agc ctg gtg ctg gtg cca gcc cag aag ctg cag      1686
Pro Lys Asp Arg Leu Ser Leu Val Leu Val Pro Ala Gln Lys Leu Gln
            455             460             465

cag cat aca cac gag aag ccc tgc aac acc agc ttc agc tac ctc gtg      1734
Gln His Thr His Glu Lys Pro Cys Asn Thr Ser Phe Ser Tyr Leu Val
        470             475             480

gcc agt gcc ata ccc agc cag gac ctg tac ttc ggc tcc ttc tgc ccg      1782
Ala Ser Ala Ile Pro Ser Gln Asp Leu Tyr Phe Gly Ser Phe Cys Pro
485             490             495             500

gga ggc tct atc aag cag atc cag gtg aag cag aac atc tcg gtg acc      1830
Gly Gly Ser Ile Lys Gln Ile Gln Val Lys Gln Asn Ile Ser Val Thr
                505             510             515

ctt cgc acc ttt gcc ccc agc ttc caa caa gag gcc tcc agg cag ggt      1878
Leu Arg Thr Phe Ala Pro Ser Phe Gln Gln Glu Ala Ser Arg Gln Gly
            520             525             530

ctg acg gtg tcc ttt ata cct tat ttc aaa gag gaa ggc gtt ttc acg      1926
Leu Thr Val Ser Phe Ile Pro Tyr Phe Lys Glu Glu Gly Val Phe Thr
        535             540             545
```

```
gtg acc cct gac aca aaa agc aag gtc tac ctg agg acc ccc aac tgg     1974
Val Thr Pro Asp Thr Lys Ser Lys Val Tyr Leu Arg Thr Pro Asn Trp
    550             555             560

gac cgg ggc ctg cca tcc ctc acc tct gtg tcc tgg aac atc agc gtg     2022
Asp Arg Gly Leu Pro Ser Leu Thr Ser Val Ser Trp Asn Ile Ser Val
565             570             575             580

ccc aga gac cag gtg gcc tgc ctg act ttc ttt aag gag cgg agc ggc     2070
Pro Arg Asp Gln Val Ala Cys Leu Thr Phe Phe Lys Glu Arg Ser Gly
            585             590             595

gtg gtc tgc cag aca ggg cgc gca ttc atg atc atc cag gag cag cgg     2118
Val Val Cys Gln Thr Gly Arg Ala Phe Met Ile Ile Gln Glu Gln Arg
            600             605             610

acc cgg gct gag gag atc ttc agc ctg gac gag gat gtg ctc ccc aag     2166
Thr Arg Ala Glu Glu Ile Phe Ser Leu Asp Glu Asp Val Leu Pro Lys
            615             620             625

cca agc ttc cac cat cac agc ttc tgg gtc aac atc tct aac tgc agc     2214
Pro Ser Phe His His His Ser Phe Trp Val Asn Ile Ser Asn Cys Ser
    630             635             640

ccc acg agc ggc aag cag cta gac ctg ctc ttc tcg gtg aca ctt acc     2262
Pro Thr Ser Gly Lys Gln Leu Asp Leu Leu Phe Ser Val Thr Leu Thr
645             650             655             660

cca agg act gtg gac ttg act gtc atc ctc atc gca gcg gtg gga ggt     2310
Pro Arg Thr Val Asp Leu Thr Val Ile Leu Ile Ala Ala Val Gly Gly
            665             670             675

gga gtc tta ctg ctg tct gcc ctc ggg ctc atc att tgc tgt gtg aaa     2358
Gly Val Leu Leu Leu Ser Ala Leu Gly Leu Ile Ile Cys Cys Val Lys
            680             685             690

aag aag aaa aag aag aca aac aag ggc ccc gct gtg ggt atc tac aat     2406
Lys Lys Lys Lys Lys Thr Asn Lys Gly Pro Ala Val Gly Ile Tyr Asn
            695             700             705

ggc aac atc aat act gag atg ccg agg cag cca aaa aag ttt cag aaa     2454
Gly Asn Ile Asn Thr Glu Met Pro Arg Gln Pro Lys Lys Phe Gln Lys
    710             715             720

ggg cga aag gac aat gac tcc cat gtg tat gca gtc atc gag gac acc     2502
Gly Arg Lys Asp Asn Asp Ser His Val Tyr Ala Val Ile Glu Asp Thr
725             730             735             740

atg gta tat ggg cat ctg cta cag gat tcc agc ggc tcc ttc ctg cag     2550
Met Val Tyr Gly His Leu Leu Gln Asp Ser Ser Gly Ser Phe Leu Gln
            745             750             755
```

```
cca gag gtg gac acc tac cgg ccg ttc cag ggc acc atg ggg gtc tgt    2598
Pro Glu Val Asp Thr Tyr Arg Pro Phe Gln Gly Thr Met Gly Val Cys
            760                 765                 770

cct ccc tcc cca ccc acc ata tgc tcc agg gcc cca act gca aag ttg    2646
Pro Pro Ser Pro Pro Thr Ile Cys Ser Arg Ala Pro Thr Ala Lys Leu
            775                 780                 785

gcc act gag gag cca cct cct cgc tcc cct cct gag tct gag agt gaa    2694
Ala Thr Glu Glu Pro Pro Pro Arg Ser Pro Pro Glu Ser Glu Ser Glu
            790                 795                 800


ccg tac acc ttc tcc cat ccc aac aat ggg gat gta agc agc aag gac    2742
Pro Tyr Thr Phe Ser His Pro Asn Asn Gly Asp Val Ser Ser Lys Asp
805                 810                 815                 820

aca gac att ccc tta ctg aac act cag gag ccc atg gag cca gca gaa    2790
Thr Asp Ile Pro Leu Leu Asn Thr Gln Glu Pro Met Glu Pro Ala Glu
                825                 830                 835

taa cttgatccat tccagacgct ttgctgagtt tcataaagca gggcactgag         2843


acacccgtcc gtgttcctaa ccagaaatcc taaagaagag gaattataca gaaggaacag 2903

caggaggttt tcctggacac cgccaacttc acattgctca gtggactcat tctaagggca 2963

agacattgaa aatgatgaat tccaatctgg atacagtcat gacagctcat gtgctcctca 3023

acttaggctg tgcggttagc cagcctgtaa tgagaggaga gaggcctgag tcacctagca 3083

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caaatgtata accacctagc tcttttcacc tgacttagta ataactcata ctaactggtt 3323

tggatgcctg ggttgtgact tctactgacc gctagataaa cgtgtgcctg tcccccaggt 3383

ggtgggaata atttacaatc tgtccaacca gaaaagaatg tgtgtgtttg agcagcattg 3443

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caagtttcca tgtgcggttc tcctagctgc agcaatactt tgacatttaa agagaaattt 3623

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agaggctggc tgcattccca ggctccagtg gctggtcaag cttttctcac atggcatcac 3923

tgtgacactg gccctcccac ttccctcttt gacttacaaa gcccaccagg aagatccagg 3983

ataatctctc catctaaaga tccttcatca tcctggaaga gccttttgcc atgcaagaca 4043

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cacaccttcc tgccactgac tcccacagga gaggctacaa aatgatctgg cgcacaggga 4163

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tttagaaggg gtgtccactt caccaggtca ccacagccca cactacgccc tatcacttcc 4343

cacaatgagg ctaagtgttt gtttctactg atcaatgccc ctgcaggttg catttattgt 4403

aatgaaaaag aaagactggg attaatctct aatcaggtga gtagaccatg agaccaatgt 4463

gtgctcacat tacccttttt cttttttttc tttttctttt tctttttttt tttaatgtga 4523

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ccttcaaaaa ataaatgtac ttcattgtat tcaatgaatt caccttggaa atgcaccgcc 5003

tcaacttgtt cacatggcat aaatgaaagg aattttatag tctcctaaat ggcgtgtact 5063

gcaagacctc ttgaacactt tccagaggat aggatattta agtcatgccc ttggcgttgc 5123

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gtgccatttg ttgaagccta ctgcatgcca gcccactgct catccacgtg gtctgccatg 5663

cctacgagga aggccagcgc atgcaggact ggtctctaat gctgtggtca ttgcacagaa 5723

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accaaaaaac aagtatcaag ctgtttaagt gcttcggcta cttgtcccct ggttcagtag 5963

aggcccggt ttcccagttg ttgactgtga caggctcagc atgggctcag cagatgctgt 6023

cttaatttgt ggatgataca gaaagccagg ctttgggata caagttcttt cctcttcatt 6083

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agtctcgcca aaaaaaaaaa                                                 6163
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<210> 4
<211> 836
<212> PRT
<213> Homo sapiens

<400> 4

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Met Ala Gly Leu Asn Cys Gly Val Ser Ile Ala Leu Leu Gly Val Leu
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Leu Leu Gly Ala Ala Arg Leu Pro Arg Gly Ala Glu Ala Phe Glu Ile
            20                  25                  30

Ala Leu Pro Arg Glu Ser Asn Ile Thr Val Leu Ile Lys Leu Gly Thr
        35                  40                  45

Pro Thr Leu Leu Ala Lys Pro Cys Tyr Ile Val Ile Ser Lys Arg His
    50                  55                  60

Ile Thr Met Leu Ser Ile Lys Ser Gly Glu Arg Ile Val Phe Thr Phe
65                  70                  75                  80

Ser Cys Gln Ser Pro Glu Asn His Phe Val Ile Glu Ile Gln Lys Asn
                85                  90                  95
```

Ile Asp Cys Met Ser Gly Pro Cys Pro Phe Gly Glu Val Gln Leu Gln
         100   105   110

Pro Ser Thr Ser Leu Leu Pro Thr Leu Asn Arg Thr Phe Ile Trp Asp
         115   120   125

Val Lys Ala His Lys Ser Ile Gly Leu Glu Leu Gln Phe Ser Ile Pro
         130   135   140

Arg Leu Arg Gln Ile Gly Pro Gly Glu Ser Cys Pro Asp Gly Val Thr
145   150   155   160

His Ser Ile Ser Gly Arg Ile Asp Ala Thr Val Val Arg Ile Gly Thr
         165   170   175

Phe Cys Ser Asn Gly Thr Val Ser Arg Ile Lys Met Gln Glu Gly Val
         180   185   190

Lys Met Ala Leu His Leu Pro Trp Phe His Pro Arg Asn Val Ser Gly
         195   200   205

Phe Ser Ile Ala Asn Arg Ser Ser Ile Lys Arg Leu Cys Ile Ile Glu
         210   215   220

Ser Val Phe Glu Gly Glu Gly Ser Ala Thr Leu Met Ser Ala Asn Tyr
225   230   235   240

Pro Glu Gly Phe Pro Glu Asp Glu Leu Met Thr Trp Gln Phe Val Val
         245   250   255

Pro Ala His Leu Arg Ala Ser Val Ser Phe Leu Asn Phe Asn Leu Ser
         260   265   270

Asn Cys Glu Arg Lys Glu Glu Arg Val Glu Tyr Tyr Ile Pro Gly Ser
         275   280   285

Thr Thr Asn Pro Glu Val Phe Lys Leu Glu Asp Lys Gln Pro Gly Asn
         290   295   300

Met Ala Gly Asn Phe Asn Leu Ser Leu Gln Gly Cys Asp Gln Asp Ala
305   310   315   320

Gln Ser Pro Gly Ile Leu Arg Leu Gln Phe Gln Val Leu Val Gln His
         325   330   335

Pro Gln Asn Glu Ser Asn Lys Ile Tyr Val Val Asp Leu Ser Asn Glu
         340   345   350

Arg Ala Met Ser Leu Thr Ile Glu Pro Arg Pro Val Lys Gln Ser Arg
         355   360   365

Lys Phe Val Pro Gly Cys Phe Val Cys Leu Glu Ser Arg Thr Cys Ser

```
              370                    375                    380
- -- ---- -- Ser- Asn--Leu- Thr- Leu -Thr Ser--Gly--Ser- Lys His--Lys I.le Ser Phe Leu
            385                    390                    395                   400

            Cys Asp Asp Leu Thr Arg Leu Trp Met Asn Val Glu Lys Thr Ile Ser
                            405                410                415

            Cys Thr Asp His Arg Tyr Cys Gln Arg Lys Ser Tyr Ser Leu Gln Val
                        420                425                430

            Pro Ser Asp Ile Leu His Leu Pro Val Glu Leu His Asp Phe Ser Trp
                    435                440                445

            Lys Leu Leu Val Pro Lys Asp Arg Leu Ser Leu Val Leu Val Pro Ala
                450                455                460

            Gln Lys Leu Gln Gln His Thr His Glu Lys Pro Cys Asn Thr Ser Phe
            465                470                475                   480

            Ser Tyr Leu Val Ala Ser Ala Ile Pro Ser Gln Asp Leu Tyr Phe Gly
                        485                490                495

            Ser Phe Cys Pro Gly Gly Ser Ile Lys Gln Ile Gln Val Lys Gln Asn
                        500                505                510

            Ile Ser Val Thr Leu Arg Thr Phe Ala Pro Ser Phe Gln Gln Glu Ala
                515                520                525

            Ser Arg Gln Gly Leu Thr Val Ser Phe Ile Pro Tyr Phe Lys Glu Glu
                530                535                540

            Gly Val Phe Thr Val Thr Pro Asp Thr Lys Ser Lys Val Tyr Leu Arg
            545                550                555                   560

            Thr Pro Asn Trp Asp Arg Gly Leu Pro Ser Leu Thr Ser Val Ser Trp
                            565                570                575

            Asn Ile Ser Val Pro Arg Asp Gln Val Ala Cys Leu Thr Phe Phe Lys
                        580                585                590

            Glu Arg Ser Gly Val Val Cys Gln Thr Gly Arg Ala Phe Met Ile Ile
                595                600                605

            Gln Glu Gln Arg Thr Arg Ala Glu Glu Ile Phe Ser Leu Asp Glu Asp
                610                615                620

            Val Leu Pro Lys Pro Ser Phe His His His Ser Phe Trp Val Asn Ile
            625                630                635                   640

            Ser Asn Cys Ser Pro Thr Ser Gly Lys Gln Leu Asp Leu Leu Phe Ser
                            645                650                655
```

```
Val Thr Leu Thr Pro Arg Thr Val Asp Leu Thr Val Ile Leu Ile Ala
            660                 665               670

Ala Val Gly Gly Gly Val Leu Leu Leu Ser Ala Leu Gly Leu Ile Ile
            675             680             685

Cys Cys Val Lys Lys Lys Lys Lys Thr Asn Lys Gly Pro Ala Val
    690             695             700

Gly Ile Tyr Asn Gly Asn Ile Asn Thr Glu Met Pro Arg Gln Pro Lys
705             710             715             720

Lys Phe Gln Lys Gly Arg Lys Asp Asn Asp Ser His Val Tyr Ala Val
            725             730             735

Ile Glu Asp Thr Met Val Tyr Gly His Leu Leu Gln Asp Ser Ser Gly
            740             745             750

Ser Phe Leu Gln Pro Glu Val Asp Thr Tyr Arg Pro Phe Gln Gly Thr
            755             760             765

Met Gly Val Cys Pro Pro Ser Pro Pro Thr Ile Cys Ser Arg Ala Pro
    770             775             780

Thr Ala Lys Leu Ala Thr Glu Glu Pro Pro Pro Arg Ser Pro Pro Glu
785             790             795             800

Ser Glu Ser Glu Pro Tyr Thr Phe Ser His Pro Asn Asn Gly Asp Val
            805             810             815

Ser Ser Lys Asp Thr Asp Ile Pro Leu Leu Asn Thr Gln Glu Pro Met
            820             825             830

Glu Pro Ala Glu
        835
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<210> 5
<211> 23
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 5
accgcctcaa cttgttcaca tgg   23

<210> 6
<211> 26

<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 6
ctggtctcag gagccagcaa cttgtc   26

<210> 7
<211> 25
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 7
ctcatgacgt ggcagtttgt cgttc   25

<210> 8
<211> 26
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 8
ggctcgctca ttactcaagt caacca   26

<210> 9
<211> 36
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 9
attcgcgact gatgatcgat tttttttttt tttttt   36

<210> 10
<211> 20
<212> DNA

<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 10
attcgcgact gatgatcgat   20

<210> 11
<211> 20
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 11
gagatattag aattctactc   20

<210> 12
<211> 17
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 12
gagtagaatt ctaatat   17

<210> 13
<211> 22
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 13
agtccatgtg aacaagttga gg   22

<210> 14
<211> 20
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 14
aattctccca cctcagcctc   20

<210> 15
<211> 22
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 15
aggatgaaaa cgacaatgtg cc   22

<210> 16
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<212> DNA
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<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 16
agaattgctt gagcccagga g   21

<210> 17
<211> 21
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 17
caacttcaca ttgctcagtg g   21

<210> 18
<211> 25
<212> DNA
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<220>
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<400> 18
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<211> 26
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 19
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<211> 26
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 20
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<211> 20
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 21
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<210> 22
<211> 19
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 22
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<210> 23
<211> 25  .
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 23
ccatcaccat cttccaggag cgaga                                    25



<210> 24
<211> 19
<212> DNA
<213> Kunstliche Sequenz

<220>
<223> Beschreibung der kunstlichen Sequenz: Primer

<400> 24
ccaagaagga aggctggaa                                           19



<210> 25
<211> 20
<212> DNA
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<210> 34
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<400> 39
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